## ***Intervention Case Study 11***

This study looks at interspersed requests as a way to decrease problem behavior when asked to do a difficult task. The first study looked at the use of interspersed requests over 2 days, with a 2 month follow up while study two looked at the use of interspersed requests

### Study One

*Introduction*

Abel is a young teenage boy diagnosed with severe mental retardation. He lives in a group home where he receives training on basic skills such as communication and dressing. When asked to do a difficult or new task, Abel often engages in problem behaviors such as self-abuse and aggression.

*Measurement*

First of all, researchers observed Abel completing easy and hard tasks. During this phase, Abel was asked to do a task and if he completed the task, he was praised. If he completed three tasks, he was given a small snack as well. If he did not complete the task, he was given help until he was able to. If he behaved aggressively, Abel was given the instructions for the task again.

Observers recorded whether Abel completed his tasks and whether he engaged in any problem behaviors. An easy task is a task Abel can complete 70% of the time without help while a hard task is a task Abel completes 33% of the time or less without help. Abel's easy tasks included pouring water from a pitcher into a glass, following a one step instruction such as "put the glass on the table," and putting on a shirt. Hard tasks included sorting silverware, following two step instructions and putting on underwear.

*Functional Behavior Assessment*

The researchers looked at the difference in Abel's behavior when asked to do hard versus easy tasks. Abel engaged in problem behavior much more often when trying to complete hard tasks as compared to easy tasks. Abel did not engage in problem behaviors at all when asked to do an easy task, so the problem behavior was probably not an attempt to avoid all work or to obtain attention. Researchers proposed that Abel's aggressive and self-injurious behaviors served as a way to allow him to escape difficult tasks specifically.

*Intervention*

Researchers used interspersed requests to decrease problem behaviors when Abel was presented with difficult tasks. With interspersed requests, a person is asked to do a series of very quick simple things and then asked to do a more difficult thing. The idea is that if someone is reinforced for successfully following instructions repeatedly, they will continue to follow instructions even if the instructions become more difficult. The difficult task should follow very closely after the simple tasks. When asked to do a difficult task, Abel would be asked to do simple tasks such as "shake my hand" or "put this in your pocket" first. After the successful completion of the simple tasks, Abel received praise. After three or four simple tasks, Abel would be asked to do the hard task. Researchers also came back two months later to do a follow-up testing of the interspersed tasks with a new difficult task.

*Results*

Before the intervention, Abel engaged in problem behavior 71.3% of the time when asked to do a hard task. When the hard tasks were interspersed with the simple tasks Abel engaged in problem behavior 0% of the time. When researchers presented simple tasks interspersed with a new difficult task (hand washing) two months after the original intervention, Abel engaged in problem behavior 6% of the time. Abel successfully completed the hard task 21.3% of the time when asked to do it at first, but when it was interspersed with the simple tasks he successfully completed it 36.3% of the time.

## Study Two

*Introduction*

Greg is a 12 year old boy, diagnosed with moderate mental retardation. He cannot speak and knows some sign language. He attends a class for disabled students in a public middle school. Greg engages in problem behaviors during school such as hitting and kicking staff, running away, yelling, and destroying property. He takes 350 mg of Dilantin everyday to help with seizures.

*Measurement*

Observers recorded how often Greg completed school tasks in the classroom. One or two sessions took place for 10 to fifteen minutes every school day. If Greg completed the assigned task successfully, he was praised. Greg's easy tasks included card games, counting with dollars and labeling of menus. Greg's hard tasks were counting with change, opening a combination lock, tying a shoe, calculating sums with a calculator, typing sentences and words, and identifying words from a newspaper. If Greg failed a task three times in a row, he was given a new task to complete.

*Functional Behavior Assessment*

Researchers looked at the difference in Greg's problem behaviors in easy versus hard tasks and saw that Greg engaged in problem behavior much more often during hard tasks. Researchers proposed that Greg used aggression and tantrum behavior to escape from a difficult task.

*Intervention*

Again, simple tasks were interspersed with the difficult ones. Simple tasks included standing up, handing over items, and closing books. Each successful completion of a task was followed by praise and 3 or few simple tasks were followed by a difficult task.

*Results*

Greg engaged in problem behavior 2% of the time during easy tasks and 40% of the time during hard tasks. When the hard tasks were interspersed with the simple tasks, Greg engaged in problem behavior 10% of the time. Greg attempted a hard task 80% of the time at first and 90% of the time when it was interspersed with easy tasks. His successful completion of the hard tasks stayed constant at 30%.

Horner, R.H., Day, H.M., Sprague, J.R., O'Brien, M., & Heathfield, L.T. Interspersed requests: A nonaversive procedure for reducing aggression and self-injury during instruction. *Journal of Applied Behavior Analysis, 24*, 265-278.